CK 9200 Page 1 of 7 1600 DATE: 11/14/2001 RAW SEQUENCE LISTING TIME: 15:14:55 PATENT APPLICATION: US/09/654 AUG 0 4 2003 Input Set : A: 4085-226-27.ST25.txt Output Set: N:\CRF3\11142001\1654449.raw TECH CENTER 1600/2900 3 <110> APPLICANT: Palmer, Michelle A.J. Gee, Melissa 5 Tillotson, Bonnie Chang, Xiao-Jia 8 <120> TITLE OF INVENTION: Receptor Function Assay for G-Protein Coupled Receptors and Receptors by Reporter Enzyme Mutant Complementation 091654499 11 <130> FILE REFERENCE: 4085-226-27 C--> 13 <140 > CURRENT APPLICATION NUMBER: US/09/654,449 14 <141> CURRENT FILING DATE: 2000-09-01 16 <150> PRIOR APPLICATION NUMBER: US 60/180,669 ENTERED 17 <151> PRIOR FILING DATE: 2000-02-07 19 <160> NUMBER OF SEQ ID NOS: 5 21 <170> SOFTWARE: FastSEQ for Windows Version 4.0 RECEIVED 23 <210> SEO ID NO: 1 24 <211> LENGTH: 6700 25 <212> TYPE: DNA JAN 2 8 2002 26 <213> ORGANISM: Artificial Sequence 28 <220> FEATURE: **Technology Center 2600** 29 <223> OTHER INFORMATION: Nucleotide sequence for pICAST ALC 31 <221> NAME/KEY: CDS 32 <222> LOCATION: (1457)...(4486) 34 <400> SEQUENCE: 1 35 ctgcaqcctg aatatgggcc aaacaggata tctgtggtaa gcagttcctg ccccggctca 60 36 gggccaagaa cagatggaac agctgaatat gggccaaaca ggatatctgt ggtaagcagt 120 37 tectgeeceg geteagggee aagaacagat ggteeceaga tgeggteeag ceeteageag 180 38 tttctaqaga accatcagat gtttccaggg tgccccaagg acctgaaatg accctgtgcc 240 39 ttatttgaac taaccaatca gttcgcttct cgcttctgtt cgcgcgcttc tgctccccga 300 40 gctcaataaa agagcccaca accectcact cggggcgcca gtcctccgat tgactgagtc 360 41 georggetae cogtetatee aataaaceet ettgeagttg cateegactt gtggtetege 420 42 tqttccttqq qaqqqtctcc tctgagtgat tgactacccg tcagcggggg tctttcattt 480 43 gggggctcgt ccgggatcgg gagacccctg cccagggacc accgacccac caccgggagg 540 44 caagetggce ageaacttat etgtgtetgt eegattgtet agtgtetatg aetgatttta 600 45 tgcgcctgcg tcggtactag ttagctaact agctctgtat ctggcggacc cgtggtggaa 660 46 ctgacgagtt ctgaacaccc ggccgcaacc ctgggagacg tcccagggac tttgggggcc 720 47 qtttttqtqq cccqacctqa qqaaqqqaqt cqatqtggaa tccgaccccg tcaggatatg 780 48 tggttctggt aggagacgag aacctaaaac agttcccgcc tccgtctgaa tttttgcttt 840 49 cggtttggaa ccgaagccgc gcgtcttgtc tgctgcagca tcgttctgtg ttgtctctgt 900 50 ctgactgtgt ttctgtattt gtctgaaaat tagggccaga ctgttaccac tcccttaagt 960 51 ttgacettag gtaactggaa agatgtegag eggetegete acaaccagte ggtagatgte 1020 52 aagaagagac gttgggttac ettctgetet gcagaatgge caacetttaa cgtcggatgg 1080 53 eegegagaeg geacetttaa eegagaeete ateaeeeagg ttaagateaa ggtettttea 1140 54 cctgqcccgc atggacaccc agaccaggtc ccctacatcg tgacctggga agccttggct 1200 55 tttgaccccc ctccctgggt caagcccttt gtacacccta agcctccgcc tcctcttcct 1260

56 ccatccgccc cgtctctccc ccttgaacct cctcgttcga ccccgcctcg atcctccctt 1320 57 tatccagece teacteette tetaggegee ggeegeteta geecattaat acgaeteaet 1380 58 atagggcgat tegaateagg eettggegeg eeggateett aattaagege aattgggagg 1440 59 tggcggtage ctcgag atg ggc gtg att acg gat tea etg gec gtc gtg gec 1492

Orphan

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RAW SEQUENCE LISTING

PATENT APPLICATION: US/09/654,449

TIME: 15:14:55

AUG 0-4 2003

Input Set : A:\4085-226-27.ST25.txt

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Output Set: N:\CRF3\11142001\I654449.raw

TECH CENTER 1600/2900

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61	cac	200	gat	cac	cct		caa	сал	tta	, המכ	age	cta	aat		_ •	taa	1540
			Asp														1340
65	Arg	1111	15	nry	110	DCI	O.I.II	20	Dea	**** 9	UCI	Dea	25		OLU		
	cac	+++	gcc	taa	ttt.	cca	σca		αаа	aca	at.a	cca		aσc	taa	cta	1588
			Ala														
69	,	30		1		-	35					40			•		
	gag	tgc	gat	ctt	cct	gag	qcc	gat	act	gtc	gtc	gtc	ccc	tca	aac	tgg	1636
		-	Asp				_	_		_	_	_					
73	45	_	_			50		_			55					60	
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	Tyr	Ser	Leu	Thr	Phe	Asn	Val		Glu	Ser	Trp	Leu		Glu	Gly	Gln	
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89		110					115					120					1076
			cgc														1876
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			ctg Leu														1924
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	a t a	ata	ctg	cac		ant	gac	aac	aπt		cta	gaa	αat	саσ		atα	1972
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105	_		175		1			180	_				185				
		. aca			e ago	gat	tto			: acc	act	. cac			. gat	t gat	2068
																o Asp	
109		190				F	195					200					
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																ı Leu	
	3 205					210					215		•	-	•	220	
115	5 cgt	gad	tac	cta	cgg	gta	aca	gtt	tct	. tta	ı tgg	cag	g ggt	gaa	acc	gcag	2164
																r Gln	
117	-	•	. -		225					230			_		235		
		gco	ago	ggc	acc	gcg	cct	tto	ggc	ggt	. gaa	att	ato	gat	gag	g cgt	2212
																ı Arg	
121	L			240)				245	i				250)		
123	3 ggt	: ggt	tat	gcc	gat	cgc	gto	aca	ı cta	cgt	ctg	aac	gto	gaa	aaa	ccg	2260
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PATENT APPLICATION: US/09/654,449 TIME: 15:14:55

DATE: 11/14/2001

Input Set : A:\4085-226-27.ST25.txt
Output Set: N:\CRF3\11142001\1654449.raw

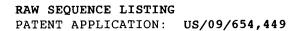
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-	L29		270					275					280					
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-	L32	Leu	His	Thr	Ala	Asp	Gly	Thr	Leu	Ile	Glu	Ala	Glu	Ala	Cys	Asp	Val	
:	L33	285					290					295					300	
:	L35	ggt	ttc	cgc	gag	gtg	cgg	att	gaa	aat	ggt	ctg	ctg	ctg	ctg	aac	ggc	2404
:	L36	Gly	Phe	Arg	Glu	Val	Arg	Ile	Glu	Asn	Gly	Leu	Leu	Leu	Leu	Asn	Gly	
:	L37					305					310					315		
-	L39	aag	ccg	ttg	ctg	att	cga	ggc	gtt	aac	cgt	cac	gag	cat	cat	cct	ctg	2452
-	L40	Lys	Pro	Leu	Leu	Ile	Arg	Gly	Val	Asn	Arg	His	Glu	His	His	Pro	Leu	
-	L41				320					325					330			
-	L43	cat	ggt	cag	gtc	atg	gat	gag	cag	acg	atg	gtg	cag	gat	atc	ctg	ctg	2500
-	L44	His	Gly	Gln	Val	Met	Asp	Glu	Gln	Thr	Met	Val	Gln	Asp	Ile	Leu	Leu	
-	L45		_	335					340					345				
-	L47	atg	aag	cag	aac	aac	ttt	aac	gcc	gtg	cgc	tgt	tcg	cat	tat	ccg	aac	2548
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-	L49		350					355					360					
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-	L53	365			_	-	370					375					380	
-	L55	gat	gaa	gcc	aat	att	gaa	acc	cac	ggc	atg	gtg	cca	atg	aat	cgt	ctg	2644
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-	L57	_				385				_	390					395		
-	159	acc	qat	gat	ccq	cqc	tgg	cta	ccq	gcg	atg	agc	gaa	cgc	gta	acg	cga	2692
										Ala								
	161		-	•	400		-			405				-	410			
]	163	atg	gtg	cag	cgc	gat	cgt	aat	cac	ccg	agt	gtg	atc	atc	tgg	tcg	ctg	2740
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	L69	_	430					435					440					
1	L71	atc	aaa	tct	gtc	gat	cct	tcc	cgc	ccg	gtg	cag	tat	gaa	ggc	ggc	gga	2836
1	. 72	Ile	Lys	Ser	Val	Asp	Pro	Ser	Arg	Pro	Val	Gln	Tyr	Glu	Gly	Gly	Gly	
		445	_				450					455					460	
1	L75	gcc	gac	acc	acg	gcc	acc	gat	att	att	tgc	ccg	atg	tac	gcg	cgc	gtg	2884
1	176	Āla	Asp	Thr	Thr	Āla	Thr	Asp	Ile	Ile	Cys	Pro	Met	Tyr	Ala	Arg	Val	
1	177		_			465		_			470			-		475		
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										Arg								
	.85	-		495					_5.0.0_	_				505				
		gcc	cac	gcq	atq	ggt	aac	agt		ggc	ggt	ttc	gct	aaa	tac	tgg	cag	3028
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	.89		510			-		515		-	-		520	_	-	-		

RAW SEQUENCE LISTING

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Input Set : A:\4085-226-27.ST25.txt Output Set: N:\CRF3\11142001\1654449.raw

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	197					545					550					555		2170
		-				_		ggc	-	_	_		_	_	_		_	3172
	200	АТа	Tyr	GIY	560	Asp	Pne	Gly	ASP	565	Pro	ASI	ASP	Arg	570	Pne	Cys	
		2+4	220	aat		ata	+++	gcc	a a c	-	аса	cca	cat	cca		ata	acc	3220
								Ala										3220
	205	1100		575	Lou				580	5				585				
		gaa	gca	aaa	cac	cag	cag	cag	ttt	ttc	cag	ttc	cgt	tta	tcc	ggg	caa	3268
								Gln										
	209		590					595					600					
				-			-	gaa		_		-			-		-	3316
			Ile	Glu	Val	Thr		Glu	Tyr	Leu	Phe	_	His	Ser	Asp	Asn		
	213		_				610					615					620	
								gcg										3364
	216	Leu	Leu	HIS	ттр	мет 625	vaı	Ala	Leu	ASP	630	гàг	Pro	Leu	Ата	635	GIA	
		(T 2 2	a+a	aat	ata		ata	gct	003	C22			car	tta	att		cta	3412
								Ala										3412
	221	Olu	Vul	110	640	пор	, 44	2114	110	645	011	1 ,5	0.1.1.	БСи	650	014	Lea	
		cct	gaa	cta		caq	ccq	gag	agc		ggg	caa	ctc	tgg		aca	gta	3460
			-		_	_	_	Glu	_	_								
	225			655					660					665				
								gcg										3508
		Arg		Val	Gln	Pro	Asn	Ala	Thr	Ala	Trp	Ser		Ala	Gly	His	Ile	
	229		670					675					680					2556
		_	_		_	_		cgt	_		-			_		_		3556
	232		Ата	тгр	GTII	GIII	690	Arg	ьеи	Ата	GIU	695	Leu	ser	Val	1111	700	
			acc	aca	tcc	cac		atc	cca	cat	cta		acc	age	αаа	atσ		3604
								Ile										3004
	237			~	002	705					710					715		
		ttt	tgc	atc	gag	ctg	ggt	aat	aag	cgt	tgg	caa	ttt	aac	cgc		tca	3652
	240	Phe	Cys	Ile	Glu	Leu	Gly	Asn	Lys	Arg	Trp	Gln	Phe	Asn	Arg	Gln	Ser	
	241				720					725					730			
								tgg										3700
		Gly	Phe		Ser	Gln	Met	\mathtt{Trp}		Gly	Asp	Lys	Lys		Leu	Leu	Thr	
	245			735					740					745				
								acc										3748
		Pro		Arg	Asp	GIn	Phe	Thr 755	Arg	Ala	Pro	Leu	760	Asn	Asp	TTE	GTĀ	
	249	at a	750	<i>~</i> 2 2	aca	200	000	/33 _att_	a a a	oot-	-2-2-4-			ato.	(722	000	taa	3796
_								Ile										3730
	253		JUI	Jiu	u		770					775		, 41	Jiu	9	780	
			qcq	qcq	qqc	cat		cag	gcc	gaa	gca		ttg	ttq	caq	tgc		3844
		,	, ,	, ,		_		_	_	-	-		_	_	,	_	-	



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256 257	Lys	Ala	Ala	Gly	His 785	Tyr	Gln	Ala	Glu	Ala 790	Ala	Leu	Leu	Gln	Cys 795	Thr	
	a a a	a a t	aca	ctt		cat	aca	ata	cta		aca	acc	act	cac		taa	3892
			Thr														3072
261	Ата	кар	1111	800	лти	лэр	пта	Val	805	116	1111	1111	AIU	810	niu	111	
	a = a	aa+	cag		222	200	++=	+++		200	caa	222	200		oaa	att	3940
			Gln														3340
265	GIII	HIS	815	СТА	гуу	1111	Leu	820	ire	ser	AIG	гу	825	тут	Aly	116	
	~~+	~~+		~~+		2+4	~~~		200	~++	ant.	a++		a+ a	a0a	200	3988
			agt Ser														3300
	ASP	-	ser	GTÀ	GIII	мес		тте	1111	Val	ASP	840	GIU	Val	АТА	261	
269	~~+	830		aa+		~~~	835	2++	~~~	ata	220		a2a	a+ a	~~~	030	4036
	_		ccg		_					_		-		-			4030
	_	THE	Pro	HIS	PLO		AIG	тте	СТА	Leu	855	Cys	GIII	Leu	нта		
273						850	.	a+ a	~~-	++-		~~~	~~~	~~~	222	860	1001
	_	-	gag		_							_		-			4084
	vaı	Ala	Glu	Arg		ASII	ттр	ьeu	GTĀ		GTÄ	PIO	GIII	GIU		тут	
277					865					870		+~~	~n+	a+ =	875	++~	4122
		-	cgc			_	-	_		-	-		-	-		-	4132
	Pro	Asp	Arg		Thr	Ата	Ald	Cys		ASP	Arg	тгр	ASP		PLO	ren	
281				880					885					890			4100
			atg														4180
	ser	Asp	Met	туг	Thr	Pro	Tyr		Pne	Pro	ser	GIU		стх	Leu	Arg	
285			895					900					905				4220
			acg														4228
	Cys	_	Thr	Arg	Glu	ьeu		Tyr	GTÄ	Pro	HIS		Trp	Arg	GTA	Asp	
289		910					915					920					4076
		-	ttc			-	-		_		_		_	-	-		4276
		GIn	Phe	Asn	TTe		Arg	туr	ser	GIn		GIn	Leu	мет	GIU		
293						930					935			_+_		940	4224
	_		cgc		_	_			_	_				_			4324
	Ser	HIS	Arg	HIS		Leu	HIS	Ala	GIU		GIY	Thr	ттр	Leu		ire	
297					945					950			.		955	+	1272
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	Asp	GIY	Phe		мет	GIY	тте	GTA	_	Asp	Asp	ser	Trp		Pro	ser	
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			gcg														4420
	vaı	ser	Ala	GIU	Pne	GIn	Leu		Ala	GLY	Arg	Tyr		туг	GIII	Leu	
305			975					980					985				4460
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	vaı	_	Cys	GIn	Lys	Arg			Tyr	ьуs	Asp			ren	Asp	HIS	
309		990					995					1000					4516
			cat				taat	aata	igg t	agat	aagt	g ac	ergat	taga	1		4516
			His	His	His												
	1005		_			1010							-				4536
	_	_		-	-											caatg	
						-	_		_					_		ccctc	
																agctt	
318	cttg	jaaga	ica a	acaa	icgto	ct gt	agco	jacco	: ttt	.gcag	gca	gcgg	aacc	CC C	cacc	tggcg	4/56

319 acaggtgcct ctgcggccaa aagccacgtg tataagatac acctgcaaag gcggcacaac 4816



VERIFICATION SUMMARY

PATENT APPLICATION: US/09/654,449

DATE: 11/14/2001 TIME: 15:14:56

Input Set : A:\4085-226-27.ST25.txt
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L:13 M:270 C: Current Application Number differs, Replaced Current Application Number